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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.	
10/646,885	08/25/2003	Shinya Asano	03560.003066.1	1251	
5514 75	590 10/21/2004		EXAMINER		
FITZPATRIC 30 ROCKEFEI	K CELLA HARPER LER PLAZA	VO, ANH T N			
NEW YORK,			ART UNIT	PAPER NUMBER	
			2861		
			DATE MAILED: 10/21/2004		

Please find below and/or attached an Office communication concerning this application or proceeding.

		Application No.	Applicant(s)			
Office Action Summary		10/646,885	ASANO ET AL.			
		Examiner	Art Unit			
		Anh t.n Vo	2861			
The MAILING Period for Reply	B DATE of this communication ap	pears on the cover sheet with the o	orrespondence ad	dress		
A SHORTENED ST THE MAILING DAT  - Extensions of time may be after SIX (6) MONTHS fr  - If the period for reply specified for reply is separated by the supply received by the supply received by the supply received by the	E OF THIS COMMUNICATION be available under the provisions of 37 CFR 1 com the mailing date of this communication. Cified above is less than thirty (30) days, a repecified above, the maximum statutory period set or extended period for reply will, by statu	LY IS SET TO EXPIRE 3 MONTHO.  136(a). In no event, however, may a reply be tired by within the statutory minimum of thirty (30) day I will apply and will expire SIX (6) MONTHS from the cause the application to become ABANDONE and date of this communication, even if timely filed.	nely filed ys will be considered timely the mailing date of this co ED (35 U.S.C. § 133).			
Status						
1) Responsive t	o communication(s) filed on <i>Pre</i>	liminary amendment filed on 8/25/	<i>′</i> 2003.			
2a) ☐ This action is		is action is non-final.				
<i>,</i> — .	Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.					
Disposition of Claims						
4a) Of the above the first section of the above	is/are rejected. is/are objected to. are subject to restriction and/ ion is objected to by the Examir in filed on is/are: a) according to the drawing sheet(s) including the corre	awn from consideration.  or election requirement.	e 37 CFR 1.85(a). ojected to. See 37 Cl	• •		
Priority under 35 U.S.	C. § 119					
a)⊠ All b) □ S  1.□ Certifie  2.⊠ Certifie  3.□ Copies  applica	Some * c) None of: ed copies of the priority documer ed copies of the priority documer of the certified copies of the pri ation from the International Bure	nts have been received in Applicat ority documents have been receiv	ion No. <u>10/190,68</u> ed in this National			
	's Patent Drawing Review (PTO-948)	4)  Interview Summary Paper No(s)/Mail D 5)  Notice of Informal	ate	0.152)		
3) 🔀 Information Disclosure Paper No(s)/Mail Date	Statement(s) (PTO-1449 or PTO/SB/06 8/25/2003.	6) Other:	atom Apphoadon (FT)	J 102)		

**DETAILED ACTION** 

Acknowledgement is made of the receipt of Preliminary Amendment filed 25 August

2003.

**Priority** 

Receipt is acknowledged of papers submitted under 35 U.S.C. 119(a)-(d), which papers

have been placed of record in the file.

Information Disclosure Statement

The references cited on PTO 1449 have been considered.

Specification

The specification has been checked to the extent necessary to determine the presence of

all possible minor errors. However, the applicant's cooperation is requested in correcting any

errors of which applicant may become aware in the specification.

Double patenting

The nonstatutory double patenting rejection is based on a judicially created doctrine

grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or

improper timewise extension of the "right to exclude" granted by a patent and to prevent possible

harassment by multiple assignees. See In re Goodman, 11 F.3d 1046, 29 USPQ2d 2010 (Fed.

Cir. 1993); In re Longi, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); In re Van Ornum, 686

F.2d 937, 214 USPQ 761 (CCPA 1982); In re Vogel, 422 F.2d 438, 164 USPQ 619 (CCPA

1970);and, In re Thorington, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

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A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent is shown to be commonly owned with this application. See 37 CFR 1.130(b).

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

Claims 1-7 and 13-19 are rejected under the judicially created doctrine of obviousness-type double patenting as being unpatentable over claims 1-20 of Patent number 6,722,761.

Although the conflicting claims are not identical, they are not patentably distinct from each other because they claim an inkjet recording device comprising:

- a tank;

- plural chambers comprising a main chamber and a needle-receiving chamber;

- a needle for suuplying ink or discharged air;

- a connecting hole;

- a resilient joint;

- a opening;

- the connecting hole is situated above the opening; and

- a meniscus of ink.

This is a <u>provisional</u> double patenting rejection since the conflicting claims have not in fact been patented.

## **CLAIM REJECTIONS**

Claim Rejections - 35 USC § 103

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The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior arts are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

Claims 1-7 and 13-19 are rejected under 35 USC 103 (a) as being unpatentable over Ikkatai et al. (US Pat. 6,022,102) in view of Takagi et al. (US Pat. 5,984,460).

Ikkatai et al. disclose in Figures 1-2B a head cartridge of an ink jet recording apparatus comprising:

- a tank (1) for containing ink, the tank (1) being divided into plural chambers (3, 14) including at least one needle-receiving chamber (14) and at least one main chamber (3) whose capacity is larger than said needle-receiving chamber (14), said main chamber (3) and said needle-receiving chamber (14) being connected through a connecting hole (12) therebetween, wherein said needle-receiving chamber (14) includes an opening (an opening which is sealed by element 17b) for insertably receiving a needle (18b) for supplying ink or discharging air from said needle-receiving chamber (14);
- wherein the opening is closed by a resilient joint (17a) through which the needle (18b) can pass;
- wherein the needle (18b) is not insertable into said main chamber (3);
- wherein, when a large amount of ink is supplied to said needle-receiving chamber (14) the ink flows from said needle receiving chamber (14) to said main chamber through (3) the connecting hole (12);
- wherein, when the amount of ink inside said main chamber (3) decreases, the ink flows from said needle-receiving chamber (14) to said main chamber (3) through the connecting hole (12) in order to replenish the main chamber (3) with ink; and

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- supply means (5, 18b) for supplying ink to said tank (3, 14) of said inkjet recording head (1), said supply means including a needle (18b) which is inserted into said needle-receiving chamber (14).

Takagi et al. disclose in Figures 1-2 an ink tank (1) for use in an ink jet printer comprising said connecting hole (9) is sized small so as to allow formation of a meniscus of ink (column 6, lines 34-35).

It would have been obvious at the time the invention was made to a person having ordinary skill in the art to incorporate the teaching of Takagi et al. into the Ikkatai et al. head cartridge for the purpose of avoiding entering of the air bubbles into the print head cartridge (see column 6, lines 41-44).

Ikkatai et al. in view of Takagi et al. disclose the claimed invention except "in the upright position, the connecting hole is situated above the opening". It would have been obvious to one having ordinary skill in the art at the time the invention was made to arrange the connecting hole which is situated above the opening for the purpose of providing a liquid communication between two chambers, since it has been held that rearrange parts of an invention involves only routine skill in the art. In re Japikse, 86 USPQ 70.

## Citation of Pertinent Prior Art

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. The prior art reference (US Pat. 5,485,187) cited in the PTO 892 form show an ink jet recording apparatus which is deemed to be relevant to the present invention. This reference should be reviewed.

## **CONCLUSION**

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Any inquiry concerning this communication or earlier communications from the examiner should be directed to Examiner Anh Vo. whose telephone number is (571) 272-2262. The fax number of this Group 2800 is (703) 872-9306.

PRIMARY EXAMINER

October 20, 2004